

Cooperation in the Mekong Basin In Implementing Integrated River Basin Management (IRBM): From Negotiation Stage to a More Concrete Joint Planning and Implementation

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I. Introduction:

The lands, through which the Mekong River flows, are bywords for great diversities both in social, economic and political situations, and in the natural conditions, such as hydrological, topographical, and morphological. With its different features, the river has been named differently by different ethnic/linguistic groups that probably provide the best description to the river. It is called “Lancing Jiang” or the Turbulent River by most of the people in China. Due to its great feature and as a main source of the livelihood, it is called by the Cambodian as the “Tonle Thom” or the Great River, and in Vietnam as the “Cuu Long” or the Nine Dragon Rivers. In Lao and Thailand, the Mekong River is known as “Mae Nam Khong” or the Khong Mother of Water.

Though the Mekong River is sometime pictured as a wild river that bring disastrous flood, for all people whose lives directly depend on it, the Mother of Waters, as the Mekong is also called, is not only a river, it is also the source of life, a way of life, a home for the spirits, a social arena, a place where life unfolds, a place of survival, beauty and challenge. Since the beginning of time, rivers have been the places where civilizations were established and people have prospered. A Chinese historian and envoy, Zhou Daguon visited ancient Angkor Empire in late 13th century located on the bank of the Tonle Sap Great Lake in Cambodia, described it as a civilization built on the success in water management and drainage.

The Mekong River is a river of great potential and challenge. It supports exceptionally rich and diverse animals and plants. Thousands of floral and faunal species of the basin are not found elsewhere. The basin supports a fishery based on more than 1,700 different fish species. It supports a huge rice production, including 40% of that of Viet Nam, the world's third largest rice exporter. It

has great tropical forests with much wildlife, including several threatened species and rare water birds. It contains beautiful wetlands, hills, lakes and rivers, and is endowed with a unique cultural diversity, with more than 70 different ethnic minorities.

While the Mekong is a source of life for millions of populations living within and directly relying on the resources of this River Basin and is one of the least spoiled and least developed of the world's great rivers, in most of the riparian countries, the poverty alleviation and accelerated development in rural areas remains high on the agenda of their national policies for socio-economic development. Challenges faced by all riparian countries in their endeavours for economic development are increasingly related to water. These water related challenges include “how to achieve efficient water allocation, recover or prevent environmental and habitat degradation, to curb with flood and drought impacts, and how to meet the growing needs for livelihood and better living standards for the rapidly growing population, etc.”

Challenges:

The international collaborative arrangements among the four countries in the Lower Mekong Basin – Cambodia, Laos, Thailand and Vietnam – have been in place for nearly 50 years now. In 1995, the four countries made a new turning point through signing a new agreement, and set up the Mekong River Commission (MRC) to replace the previous Mekong Committees, aimed at promoting sustainable development of the Mekong River Basin. Though they have made remarkable progress, this cooperation framework has more room for improvement for ensuring a more comprehensive and basin-wide management of this great river. Considerable challenge lies ahead for MRC and its member countries if sustainable social and economic development is to be realised. These challenges include:

- To manage greater pressure on water resources from a growing population's needs for clean and adequate water, food and energy supplies to support economic development, without causing serious damage to the environment and ecological system.
- To achieve reasonable and equitable sharing of available resources and benefit derived from them to satisfy the requirements of the riparian countries and its people.
- To ensure that funds are mobilized and used effectively and that programmes are being implemented in co-ordination with other national, bilateral and international development efforts in the basin.
- With six countries involved, each with different legal and institutional systems and cultures, this is no easy matter. Two up-stream countries are not members of the Mekong River Commission. It is quite obvious that not only does the livelihood of the people depend on proper and shared

management of the Mekong waters; so too does friendly relations between the six countries of the Mekong basin.

II. Geography and Hydrology:

Originating from Tibet Plateau about 5000 meters above mean sea level, The Mekong River flows nearly 4,880 km. through six countries, namely China, Myanmar, Lao PDR, Thailand, Cambodia and Vietnam into the South China Sea, which ranks it the world's 12th longest. It is the world's 8th largest river in terms of water volume (Total runoff annually is about 475,000 million cubic meters). Its catchment area is approximately 795,000 km³, with around 200 tributary river basins. It possesses the region's largest potential water resources. These water resources have the ability to support on going economic development in terms of irrigation, hydropower, navigation, water supply and tourism. However, these resources are not evenly distributed in time and space. At the same time, there is a need to protect the basin/s unique and productive aquatic system, in order to ensure that the water resources in the basin are developed in a sustainable manner. (See Maps 1 & 2).

Compared with other large rivers, the volume of water flowing through the Mekong each year is remarkably predictable. Between high and low flood years there is relatively little difference in volume. Although no changes in rainfall patterns are apparent since 1950, more water has been flowing through the river during the dry season and less during the wet season. The most likely explanation is human intervention through the building of dams for irrigation and hydropower.

Climate in the Mekong Basin ranges from tropical to cool temperate. Some of the higher peaks on the Tibetan Plateau are permanently snow-capped and much of this part of the basin is under snow in winter. Dry season flows downstream are maintained partly by the melting of these snows. At lower elevations in China's Yunnan Province, the climate warms and annual rainfall is as high as 1,700 mm. In the Lower Mekong Basin, the largely tropical climate is characterized by two monsoons from the southwest (in rainy or wet season) and the northeast (dry season). Wet season starts from June to October/November, and a largely-dry season is for the rest of the year. In the hottest months of March and April, average temperatures range from 30°C to 38°C, depending on location and altitude. Coolest temperatures occur between November and February. At higher elevations in Lao PDR, cool temperatures average 15°C. In the lower basin, the rain soaked uplands in Lao PDR and Cambodia receive the most rain (3,000 mm), and the semi-arid Korat Plateau in Northeast Thailand, the least (1,000 to 1,600 mm).

During the wet season from June to October, the average amount of water in the Mekong during the peak month of September is 20-25 times larger than during the dry season. In dry season, some locations along the river experience water shortage. The heart of the Basin's aquatic-based

ecosystem lies in the wetlands and flooded forests in the Tonle Sap Great Lake, the Plain of Reeds in Vietnam and Cambodia, and the Mekong estuary along the southern coast of Vietnam. The Tonle Sap Great Lake, the largest fresh water body in Southeast Asia and the heart of the Mekong River system, covers an area of 250,000 – 300,000 ha (3,000 km²) in the dry season, and 1,300,000 ha (13,000 km²) in the wet season, extending over 300 km from the Northwest of Cambodia to the Mekong river at Phnom Penh. So at the peak of the flood season, the lake is six times larger in area and it deepens from half a meter to eight meters or more.

The Tonle Sap supports an extensive flooded forest which provides an ideal habitat for fish spawning and nursing. Fish migrations from the Tonle Sap are believed to help restock fisheries as far upstream as China and in many tributaries along the way. In the dry season it slowly drains into the Mekong River near the head of the delta, providing a substantial part of the dry season flow in this part of the Basin and help to significantly control salinity intrusion and to conserve the mangrove forests.

During the wet season the river becomes immense, and flooding, although providing many benefits, also causes severe damages to economy, people's lives and property. The abnormal floods in the Mekong basin occur in a higher frequency. In 2000, 2001, and 2002 – three years in a row, exceptional floods caused serious economic damage and loss of hundred of lives. The year of 2002, drought also took a heavy toll in some part of the Mekong countries, while at the same time, river floods caused severe damage to the population living in the flood plains. The risk of devastating flood is on the rise, due to both man-made and natural causes. Recurring of natural disaster of the magnitude and frequency observed in the Lower Mekong Basin are a serious impediment for a more rapid socio-economic development in the region.

MRC' s Data indicates that water quality in the Mekong is generally good, especially when compared with many other great rivers in the world. Sediment levels are declining as is salinity, but there have been increases in nutrients (nitrogen and phosphorus) at most sites in the Mekong delta. Concerns have been raised that there appear to be increased sediment levels in the river. This perception has led to worries that within a few decades, the vast and highly productive Tonle Sap Great Lake in Cambodia will silt up, with enormous consequences for aquatic life and fisheries. However, records dating back to 1992 show that sedimentation levels are actually declining. Research also shows that the sediment at the bottom of the Tonle Sap Great Lake is increasing at a rate of only 0.001 mm per year. At this rate it will take thousands of years for the lake to fill with silt.¹ The most likely explanation for the decline in

¹ See for example, MRC, *State of the Basin Report*, Phnom Penh, Cambodia, 2003.

sediment is that it is being trapped upstream behind the dams that have been built for hydroelectric and irrigation projects.

III. Beginnings of cooperation among Mekong Countries

Politically, and geographically, the Mekong Basin has been divided into the upper and lower systems. The upper system is in itself a large river. Its hydrological significance and relevance to the resources of the lower basin are critical for the reason that “Yunnan Component” (as flows entering the lower basin are generally known) dominates the low flow (dry season) hydrology throughout much of the overall Mekong system. Any modification of the seasonal regime of the upper river by reservoir regulation for example would therefore have significant consequences as far downstream as Cambodia and Vietnam. A disproportionate volume of the dry season base flow is generated in Yunnan, such that as far downstream as Kratie it constitutes over 40% of the flow in April in an average year.

While the formal international cooperation among the Lower Mekong Countries – Laos, Thailand, Cambodia and Vietnam – has existed and developed over the past 48 years, the involvement of other two upper-stream countries – China and Myanmar – has just started very recently and in a less formal way.

✓ Mekong Committee

Formal cooperation between Cambodia, Lao PDR, Thailand and Viet Nam has been under way for decades. In 1957, with support from ECAFE, the Economic Commission for Asia and the Far East (now called ESCAP, the United Nations Economic and Social Commission for Asia and the Pacific), the four LMB countries set up the Committee for Coordination of the Investigation of the Lower Mekong Basin (generally known as “The Mekong Committee”).

In the 1950s and 1960s, in order to develop one of the world’s great ‘untamed’ rivers, ECAFE and the Mekong Committee jointly conducted surveys of the basin’s geology, hydrology, meteorology, topography, sedimentation, fisheries, agriculture and navigation. These led to the development of an Indicative Basin Plan in 1970 and identification of 181 potential projects worth an estimated US\$12,000 million. For a variety of reasons, including conflict in some of the countries in the basin, few of the Mekong Committee’s ambitious projects were ever realized. However, the plan did lay the foundations for collaboration among Lower Mekong Basin (LMB) governments in natural resource planning.

✓ The Mekong River Commission

In 1995, the four LMB governments established a new organization – the Mekong River Commission (MRC), with a much broader mandate than the preceding Mekong Committee, and managed by the four countries themselves. MRC’s vision for the basin and its mission statement

commit the organization to equitably and reasonably sharing resources and sustaining both the environment and human welfare.

**Vision and
Mission of
MRC**

MRC's Vision for the Mekong Basin: An economically prosperous, socially just and environmentally sound Mekong River Basin.

MRC's Mission Statement: To promote and coordinate sustainable management and development of water and related resources for the countries' mutual benefit and the people's well being by implementing strategic programmes and activities and providing scientific information and policy advice

Attempt to move from Negotiation Stage to a more Concrete Co-operation for the Sustainable Development of the Mekong River Basin:

The basis to MRC cooperation lies fundamentally in the *Agreement on the Co-operation for the Sustainable Development of the Mekong River Basin*, signed in Chiang Rai in Thailand on 5th April 1995 between the Governments of the Kingdom of Cambodia, the Lao People's Democratic Republic, the Kingdom of Thailand and the Socialist Republic of Viet Nam. It is necessary therefore to first appreciate the objectives and principles established under this Agreement, the main elements of which are summarised below.

The Preamble sets out the broad objectives behind the Agreement. These include expressions of determination by the Riparian members to:

- (i) Promote sustainable development, utilisation, conservation and management of the Mekong River Basin water and related resources for navigational and non-navigational purposes, for social and economic development, and the well-being of all riparian States, consistent with the need to protect, preserve, enhance the environment and maintain the ecological balance of the Basin,
- (ii) Promote inter-dependent sub-regional growth and co-operation among the community of Mekong nations, and
- (iii) Provide an adequate, efficient and functional joint organizational structure to implement the 1995 Agreement, programmes and activities, and to address and resolve issues and conflicts.

Chapter III sets out the Objectives and Principles of Co-operation. These relate to the manner by which the basin is developed. Key objectives are set out as:

- (i) To optimise the multiple-use and mutual benefits of all riparians and to minimise the harmful effects from natural occurrences and man-made activities;
- (ii) To develop the full potential of the basin with emphasis and preference on joint and/or basin-wide development projects through the formulation of a basin development plan that would prioritise the projects and programmes to implement at basin level; and
- (iii) To protect the environment, natural resources, aquatic life and ecological balance of the basin from pollution or other harmful effects due to the use of water and related resources.

The principles laid down by which co-operation is to be ensured are that each Riparian should utilize the Mekong River system in a reasonable and equitable manner in their respective territories, subject to rules to be established under the Agreement, and in line with the following provisions.

- (i) Notification is required of all diversions in the tributaries and of intra-basin use in the wet season on the mainstream. Prior consultation is required for inter-basin diversions in the wet season from the mainstream and for intra-basin use on the mainstream in the dry season. Inter-basin diversions from the mainstream in the dry season require case-by-case consultation and specific agreements where there is no surplus flow (the term *surplus flow* is yet to define).
- (ii) Riparians are to cooperate in the maintenance of flows in the mainstream, (A) of not less than the acceptable minimum monthly natural flow during each dry season month, (B) enabling acceptable reverse flow of Tonle Sap in the wet season, and (C) to prevent an increase in average daily peak flows above naturally occurring ones in the wet season, except for the historically severe drought or flood times.
- (iii) In making every effort to avoid, minimise and mitigate harmful environmental effects, especially relating to water quantity and quality, aquatic conditions (eco-system) and ecological balance of the river system, a State or States must cease immediately an activity if it is notified with proper and valid evidence by another State that the activity is causing substantial damage, until such time as the matter is resolved between the concerned States.
- (iv) The Mekong River is to be kept free of obstructions that might impair navigability. Although navigation is not necessarily a top priority, navigational requirements must be incorporated into any mainstream project.

Chapter IV deals with institutional issues. The Agreement states that the Mekong River Commission, itself to be recognised as an international body, shall consist of three permanent bodies: Council, Joint Committee, and Secretariat.

The Council comprises one member at the Ministerial or Cabinet levels from each participating riparian State who is empowered to make policy decisions on behalf of his/her Government. The functions of Council are to make policies and decisions and to resolve issues, differences and disputes.

The Joint Committee comprises one member from each participating riparian State at no less than Head of Department level. The functions of Joint Committee include implementation of policies and decisions of the Council, formulation of a periodically reviewed and updated basin development plan for Council approval, ensuring exchange of data, conducting appropriate environmental studies, assigning tasks to and supervising the Secretariat, and addressing and resolving pertinent issues. The Joint Committee is specifically empowered to prepare and propose to the Council Rules for Water Utilisation and Inter-Basin Diversions, including establishing (1) the time frame for the wet and dry seasons, (2) the location of hydrological stations and determining and maintaining the flow level requirements at each, (3) criteria for determining surplus quantities

of water during the dry season on the mainstream, (4) improved mechanism for monitoring intra-basin use, and (5) a mechanism to monitor inter-basin diversions from the mainstream.

The Secretariat, under a Chief Executive Officer, shall render technical and administrative services to the Council and Joint Committee, under the supervision of the Joint Committee.

Concrete Steps to Implement the 1995 Agreement

To facilitate implementation of the 1995 Agreement, the MRC Secretariat (MRCS) has taken up four core programmes:

- The Water Utilization Programme (WUP)
- The Environment Programme (EP)
- The Basin Development Programme (BDP)
- Flood Management and Mitigation Programme (recently upgraded from sector programme)

Together with four sector programmes:

- The Fisheries Programme
- The Agriculture, Irrigation and Forestry Programme (AIFP)
- The Water Resources and Hydrology Programme
- The Navigation Programme

As well as a Capacity Building Programme, and other ongoing activities for development of the MRC Information System.

The Water Utilisation Programme (WUP) Start-Up Project will provide the technical and institutional capacities required for longer-term co-operation for sustainable management of the basin's water and ecological resources. There are three components to the WUP Start-up Project:

A. *Basin Modelling and Knowledge Base* (completed by early 2004)

B. *"Rules" for Water Utilisation*

- ✓ Procedures for Data & Information Exchange (into force by 01 November 2001);
- ✓ Preliminary Procedures for Notification, Prior Consultation and Agreement was adopted on 12 November 2002
- ✓ Procedures for Water Use Monitoring (into force from 30 November 2003)
- ✓ Procedures for Notification, Prior Consultation and Agreement (in force from 30 November 2003).
- ✓ Rules for the Maintenance of Flow to be completed by late 2004; and
- ✓ Rules for Water Quality to be completed by late 2005.

C. *Institutional Strengthening*

There are several parallel projects and initiatives under parallel financing that are inter-dependent with WUP programme. These include:

- Finnish parallel co-financing for Tonle Sap modeling and database development

- French parallel co-financing for water quality data improvement and modeling.
- Japanese parallel co-financing for assistance in water quantity rules development and data gap filling.

The Basin Development Planning Programme

The 1995 Agreement defines the Basin Development Plan (BDP) as a general planning tool and process to identify, categorise and prioritise projects and programmes for which to seek assistance and implement at basin level in order to promote, support, co-operate and co-ordinate in the development of the full potential of sustainable benefits to all riparian countries and prevent wasteful use of waters in a manner that is consistent with the need to protect, enhance and manage the ecological balance unique to the MRB.

The BDP mission statement elaborates these concepts further: The basin development planning process is to contribute to improvement of standards of living and support environmental sustainability in the Mekong Basin. A BDP, which is to be periodically updated, will be produced to serve as a framework for co-operation among the riparian countries to utilise the full potential of sustainable benefits of the water and related resources of the MRB. Initiatives. Interdependent sub-regional development will be encouraged through cooperative actions initiated by the MRC and other agencies concerned.

The BDP is to be carried out in two phases. The first phase will formulate the BDP, and the second phase will revise and consolidate it. Phase 1 started at the beginning of October 2001 until second half of 2005.

Integrated Basin Flow Management: The Mekong Method for Setting Flows for Sustainable Development is another MRC programme activities to help MRC member countries to implement the 1995 Mekong Agreement’s key provisions relating to flow maintenance and water sharing.

Integrated Basin Flow Management” (IBFM) activities have been started over the past year by MRC (led by Water Utilization and Environment Programmes) to address an important requirement of the 1995 Agreement – that of determination of “acceptable” flows and the requirement for maintenance of the ecological balance of the Mekong River Basin as provided by Articles 3 and 6. To address this requirement, in view of significant limitations in available data, and to provide a sound technical basis for flow determinations in the longer-term, a three-phased approach was finally developed. The GEF-funded World Bank-implemented WUP will fund Phases 1 and 2 described in this report. Phase 3 will be funded through the Environment Program. This three-phased approach can be summarized in the following box:

<p>BDP sectors Irrigated agriculture Watershed management Fisheries Hydropower Navigation etc Recreation etc Water supplies (domestic and industrial) Flood control and management</p> <p>Cross-cutting issues Environment (eco-systems and demands) Human Resources Development Socio-economics (poverty, gender etc) Public participation</p>
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Phase 1 - Flows determined through hydrological analyses: In view of the 2004 Rules milestone, a relatively rapid first assessment is required of what constitutes acceptable flows. The Phase 1 flow assessment will assume that the four riparian countries do not wish to lose or reduce any existing uses, whether in-stream, stream or off-stream. The assessment will be based on the present-day flow regime, as it is assumed that it does, and can continue to, sustain current beneficial uses. In the assessment, a basic set of hydrological analysis of the present-day flow regime will be used to develop a common understanding of the hydrology of the Lower Mekong Basin (LMB), and then some of these statistics will be used to define interim flow rules. The newly formed Technical Review Group (TRG) representing the four member countries will make recommendations to the JC on the flows, which will provide the numbers to be used by Technical Drafting Group 5 (TDG5) in the "Rules for Maintenance of Flows" framework. Both the drafting of the RMFM framework by TDG5 and determination of flows through Phase 1 of the IBFM and the TRG will be completed during 2004.

Phase 2 - Environmental flows assessment based on available knowledge: Because Phase 1 identifies status quo and does not address how to manage long-term basin development, a more holistic assessment of likely consequences of possible basin development on the river and its users will begin in parallel with Phase 1. This will use existing data and knowledge, and is designed to develop capacity in building scenarios of possible future basin and river conditions, and making decisions about which are acceptable. A multi-disciplinary team of recognized international and local river specialists will assess a range of possible future flow regimes provided by Basin Development Programme (BDP), which reflects increasing levels of LMB development. The assessment will conclude in mid 2005, producing a description of river condition and the socio-economic implications, for a range of basin-development scenarios. From these, the TRG will recommend one or more acceptable scenarios, for consideration by the JC. If necessary and appropriate, the preliminary flow rules established in Phase 1 may then be modified.

Phase 3 - Environmental flows assessment based on directed research: Phase 3 will be a long-term comprehensive and holistic flow assessment study commencing in 2004/2005. It will build on the knowledge synthesized in Phase 2, conducting a directed program of new research on the river and its users. It will be managed and implemented by the Environment Program, and lead to more detailed and higher-confidence scenarios than those provided in Phase 2. If deemed necessary and appropriate by the TRG and JC, the flow rules established in Phase 2 may then be revised.

The Basin Development Plan, rules and agreements to be developed under these MRC programmes, effectively will define in more concrete terms what is acceptable for an individual country to do in terms of water resource development and land management and, what is not acceptable, as well as those possibilities for joint development and benefit sharing.

IV. Cooperation to promote balanced development

And yet MRC has accomplished a remarkable success since the 1995 agreement was signed. Building on strategic plans of 1998 and 2001 and supported by a major restructuring of the MRC secretariat in 2000, MRC has reshaped itself from its earlier image of being sectoral, slow, closed, and hydropower-focused, to become a modern organization fully poised to support a broad-based, integrated and participatory approach to river basin management. From being an organization lacking focus and with an uncertain future, MRC has become clear about its goals, and equipped itself with the structure, staff, skills, morale and external network to reach them. The MRC, while operating in a complex, dynamic, multi-national environment, dependent on external donor support, has succeeded in its task through the introduction of a dynamic and value-based strategic management system, combined with a full commitment to a programme approach and to cross-sectoral work.

It is very challenging for the MRC and its member countries to further enrich this rather general and framework agreement – 1995 Mekong Agreement - with additional workable and more operational sub-agreements which requires more than just sufficient technical and financial support, but also the real political commitment from the governments of the member countries. More challenges are anticipated. Some of them are discussed down below.

One important pillar of the "new MRC" has been to open up and embrace participatory planning. MRC has carried out all its recent planning exercises through broad, participatory processes. While costly and time-consuming, this has proved invaluable in creating the necessary agreement on priorities and ownership of the programmes at all levels of national governments. Reflecting the modest tradition of public participation in government decision-making in the region, MRC has a lot of things to catch up with and prepare for such involvement. Public participation has been ad-hoc, and mostly related to the fishery programme. As delivery of the new programmes accelerated and the next generation of plans are developed, public participation is being an integrated part of the MRC planning and implementation process. Important preliminary steps have been taken. Partnership agreements have been established with major international organizations and NGOs. Starting from 2002, civil society representatives are also invited to attend the highest level of MRC decision-making, the Joint Committee and the Council. A detailed assessment has been carried out as a first step to a comprehensive MRC public participation strategy and action plan.

All four countries, members of MRC, have officially endorsed the integrated water resource management (IWRM) in their respective countries. At least three of them – Thailand, Vietnam and Cambodia – have embarked on their own process of establishing river basin organizations (RBO) for imbedding and implementing IWRM. The establishment of RBOs in MRC member countries is a promising, but equally challenging undertaking. The IWRM challenges all concerned agencies and individuals to have a broader and comprehensive view. Thus the enabling legislation, adequate financing, and close interaction between MRC as an intergovernmental organization with basin-wide mandate, and the national RBOs are badly needed.

Secondly, of late, a number of transboundary issues have emerged also in the Mekong River Basin, that demonstrates that regional governance structures and practices in the Mekong River Basin region may be not sufficiently adequate to address them. Upstream and downstream dynamics and transboundary challenge of the Mekong River Basin exhibits a degree of complexity. All six countries and people heavily rely on the rich resources of this river as a source of social and economic development. Series of large hydropower dams have been planned and built on the Mekong Mainstream in Yunnan, and on tributaries in Thailand, Laos and Vietnam. The expansion of irrigation schemes, and flood and bank protection measures in Vietnam, Laos, Cambodia and Thailand, improvement of navigation channel along the mainstream in the upper reach of the

Mekong River, and long-planned inter-basin diversion proposals in Thailand, also contribute to significant upstream-downstream implications.

These challenges highlights the imperative for decision making processes that have to go beyond the borders of the sovereign countries, and requires active and equal participation of all Mekong riparian states. Since, the national governments occupy a central position in almost all decision making processes, their participation in a well structured and transparent regional cooperation framework, is needed for any viable long-term management of the Mekong River Basin in a more concerted and holistic manner. This highlights the need for full recognition of the role of the regional institutions to provide more effective channels for cooperation and collaboration among all key stakeholders.

One of the daunting tasks for the lower Mekong countries is to have the two upper-stream countries – China and Myanmar – to get more actively and closely involved in this international cooperation for a sustainable development and management of this transboundary river basin. The strong desire of the four Lower Mekong countries to have China and Myanmar involved as the MRC member countries has clearly expressed beyond any doubt. The MRC member countries see that lack of full participation of all Mekong riparian countries in the MRC is still a significant problem for a regional organization seeking to promote sustainable development of the transboundary river basin.

Since 1996, both up-stream countries have been the official dialogue partners of the MRC. In early April 2002, the MRC and China signed the Agreement on the Provision of Hydrological Information from two Chinese monitoring stations to the MRC for its flood forecasting operation. For the coming years, greater efforts must be made to alleviate this low level of technical cooperation to a more substantive engagement with China and Myanmar.

Another challenge is how to manage and coordinate the “congestion” of the Mekong regional initiatives and frameworks. Starting from early 1990, more and more regional mechanism and initiatives dealing with the use and management of the resources of the Mekong River Basin have emerged. Each of them has its own focus, principles or norms that determine how it cooperates and defines its strategic direction and priority. Though, amazing enough, nearly all of these regional initiatives and bodies draw their financial and technical support from almost the same pool of donors and contributors. In face of that situation, to maintain their relevancy and robustness in face of the rapid emergence of other regional programmes and institutions dealing with the Mekong River Basin’s water and related resources is another challenge as well for MRC and other Mekong initiatives and programmes.

While MRC is the only regional body mandated by the international treaty with a clearer task of managing the Mekong River Basin among the four lower Mekong countries (China and Myanmar are observers only), the Greater Mekong Sub-region (GMS) is the only regional forum in which all six Mekong riparian countries participate. The Agreement on Commercial Navigation

with Myanmar, Laos and Thailand, is the only treaty relating to the Mekong River that China is a party to. The Committee and joint working groups have been set up to implement the plan for improving the navigation channel from Jinghong in Yunnan, China to Laung Prabang in Lao PDR. Some observers maintained that while this new river trade route would provide some benefits for the people, however, the removing of shoals and rapids, and dredging the riverbed could affect the fish habitat and reproduction, and be a source of upstream and downstream conflicts.

The technical aspects of planning, development and environmental management are relatively simple in comparison with the challenge of identifying preferred and commonly agreed upon outcomes for the basin. Outcomes range from that of a completely pristine basin with intact ecosystems – a kind of wilderness with almost no people – to a basin covered in concrete and factories, with a polluted river reduced to a chain of reservoirs. Neither extreme would be acceptable to most of the people in the basin. The challenge lies in achieving consensus regarding where, between these two extremes, the level of development should fall. The six countries that share the Mekong basin have differing development goals and these are not always in accord with each other, or with those of people at the village level. Nor do the goals of government necessarily match those of civil society groups.

The first step towards effective planning is the building of collaborative relations across the basin, and this requires understanding, trust and breadth of vision. Fortunately, unlike many other regions in world, a start has been made in the Mekong Basin while the river is still in good condition and natural resources are still abundant. Because of these differences, it is now recognized worldwide that successful planning must be inclusive and take into consideration the needs and aspirations of all stakeholders. The MRC's Basin Development Plan project is one recent initiative that is working to develop an inclusive planning process. However, achieving this goal will not be easy. Even in developed countries with far greater resources, inclusive planning processes have been difficult to achieve. Usually plans leave some stakeholder groups dissatisfied, and none achieve all of their goals.

V. Lesson Learnt:

If countries are to live peacefully and equitably within a river basin it is obvious that there must be a true spirit of transparency, trust and mutually beneficial cooperation both within and between countries. If development is to be successful and sustainable within the Mekong River Basin, it is also a must that development must take a basin-wide perspective if it is to help in reducing, rather than intensifying, tensions between them.

From the Mekong experience, regional cooperation which lacks advanced legal and institutional mechanisms to support it will find it very difficult to move beyond the level of meetings and plans to the real world of concrete political agreements and joint programmes. A legal

agreement itself is, of course, only a piece of paper, of little value before its content is used as a guide for action, and before effective institutions are in place to support those actions.

Building effective institutions and securing its relevance and countries real commitment to abide by the accord, are, however, more difficult than reaching an agreement to do so. Recognition of the need for cooperation, and commitment to cooperative behaviour of the kind in the 1995 Mekong Agreement will not themselves lead to effective cooperation by the State Parties. And creating an effective inter-governmental institution in an economically poor region, with a history of ideological conflicts and war, where vertical, sectoral thinking is predominant, where national institutions suffer from severe capacity constraints, and where financing is a huge problem, is a daunting task indeed. Hence, despite the emphasis on cooperation and mutual benefits, a Basin Agreement may contain the basis for future conflict if it is managed properly and effectively. The prevention of conflict over the interpretation of the Agreement, and over the development and utilization of the resources, require that:

1. Accepted scientific data and information, as well as other relevant decision support tools should be in place to ensure that the decision is made in a timely manner with all required support and facts. Data collection and knowledge generation must be regarded as one of the important parts of the international cooperation efforts.
2. The 1995 Agreement is a framework agreement which is subject to further fulfillment, refinement and change within the agreed framework, and as new needs arise and new knowledge about the basin becomes available. From the MRC's experience, the process proves to be very time consuming, highly sensitive, and politically and technically complex process. Of course the development of these "Water Utilization Rules" and agreement on the specific development projects and programs through the BDP process is to provide the best method for proactively addressing the potential conflict. This process can be itself a source of conflict, if it is not properly designed and carried out, and if there is no real and sincere political will from and no all required support and information are available to the member countries, and their national agencies concerned.
3. Capacity and institutional building National Agencies for coordinating and discharging national obligation arising from the agreement and its subsequent rules and standards are very important. First of all, it is very crucial to have an improved institutional structure and process, and the willingness and ability of the national agencies and other key stakeholders to participate in good faith in these structure and processes, to prevent and resolve conflict over competing resources uses and other transboundary issues..
4. Availability of external and independent means for defusing the issues or conflict: Mediation and fact finding are a useful means to assist with preventing conflict, problem-solving and conflict management in complex conditions as the Mekong. If all necessary information is

shared, and if additional fact-finding is conducted, the potential benefits for each side are maximized in preventing and solving the conflict.

5. Finally, the Inclusiveness of all concerned stakeholders is very crucial for ensuring more comprehensive river basin management.

While international and regional bodies such as MRC, ADB, UNESCAP, World Bank, UNDP, and ASEAN have to play a principal role in managing or articulating the regional aspects of the Mekong River Basin management and development, there are many other non governmental bodies, such as World Wild Fund (WWF), International Union for Conservation of Nature (IUCN) and Oxfam and so on have great experience in outreaching and articulating the interests and concern of the people at the grass-root levels. Hence, the existence of strong civil society groups, international linkages and channel for their meaningful contribution into planning and policy are important factors in effective regional governance of the Mekong River Basin. Moreover, many international financing institutions, such as the World Bank, ADB, and other major donors have a role to play in encouraging and advocating greater transparency and public participation in the regional planning and decision-making on planned developments and commitments to inform the public of their potential impacts.

VI. Conclusion

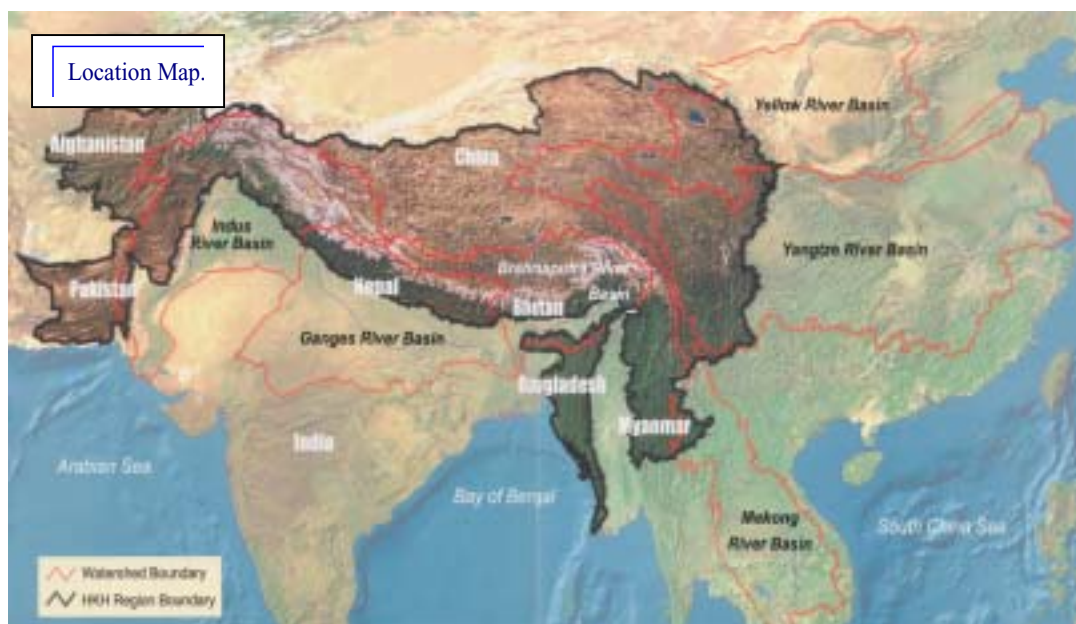
In many ways, MRC's core task could be described as that of building awareness, understanding and trust, to form a sound platform for regional collaboration. Trust is built on extensive and high quality dialogue within and between countries, at political as well as technical levels. While requiring major and patient effort, progress in awareness raising and trust-building is difficult to measure. It is seen mainly in the quality of dialogue, in the attitude of specialists and senior officials participating in seminars and meetings, in the willingness to raise sensitive matters and seek mutual understanding at the political level, and in the genuineness of effort in keeping joint programmes on track and seeking mutually beneficial solutions. Judging from indications such as the number and quality of exchanges taking place in the context of MRC's programmes, the progress being made in MRC core programmes, and the speed with which a regional flood management strategy was put in place in response to the 2000 floods, a gradual shift from earlier suspicion to trust and collaboration is evident, promising well for the future.

The proactive and adaptive management approach, and the "Mekong Cooperation Spirit" has so far helped MRC member states for the last 47 years in preventing and turning the potential conflicts to a mutually beneficial cooperation and sustainable development of the Mekong River Basin. Such cooperation was tested during the cold war period. The future looks promising – and exciting. The political commitment to collaboration, however, will be put to the test during the next 2-3 years, when the tough decisions that the member countries have committed themselves to make in the context of MRC programmes have to be made.

It is true that the development, consistent application, monitoring and enforcement of agreed upon policy are an effective means to build up mutual trust and confidence, and thus avoid conflict. The absence of agree upon policy and legal instruments means that a reference point is lacking which could otherwise be used to prevent or solve differences or dispute. The solutions to the issues of sustainable development are complex and multifaceted. But the solutions can be found. It is time for a concerted and concreted action.

Reference:

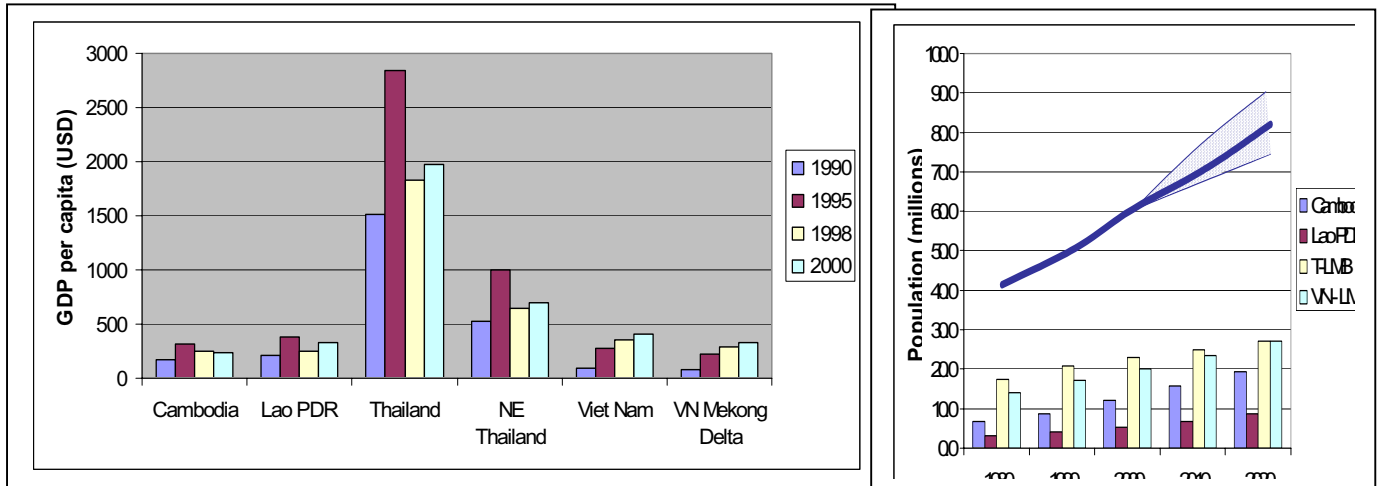
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Box 1: Water Resources in Mekong Basin (Source: MRC)

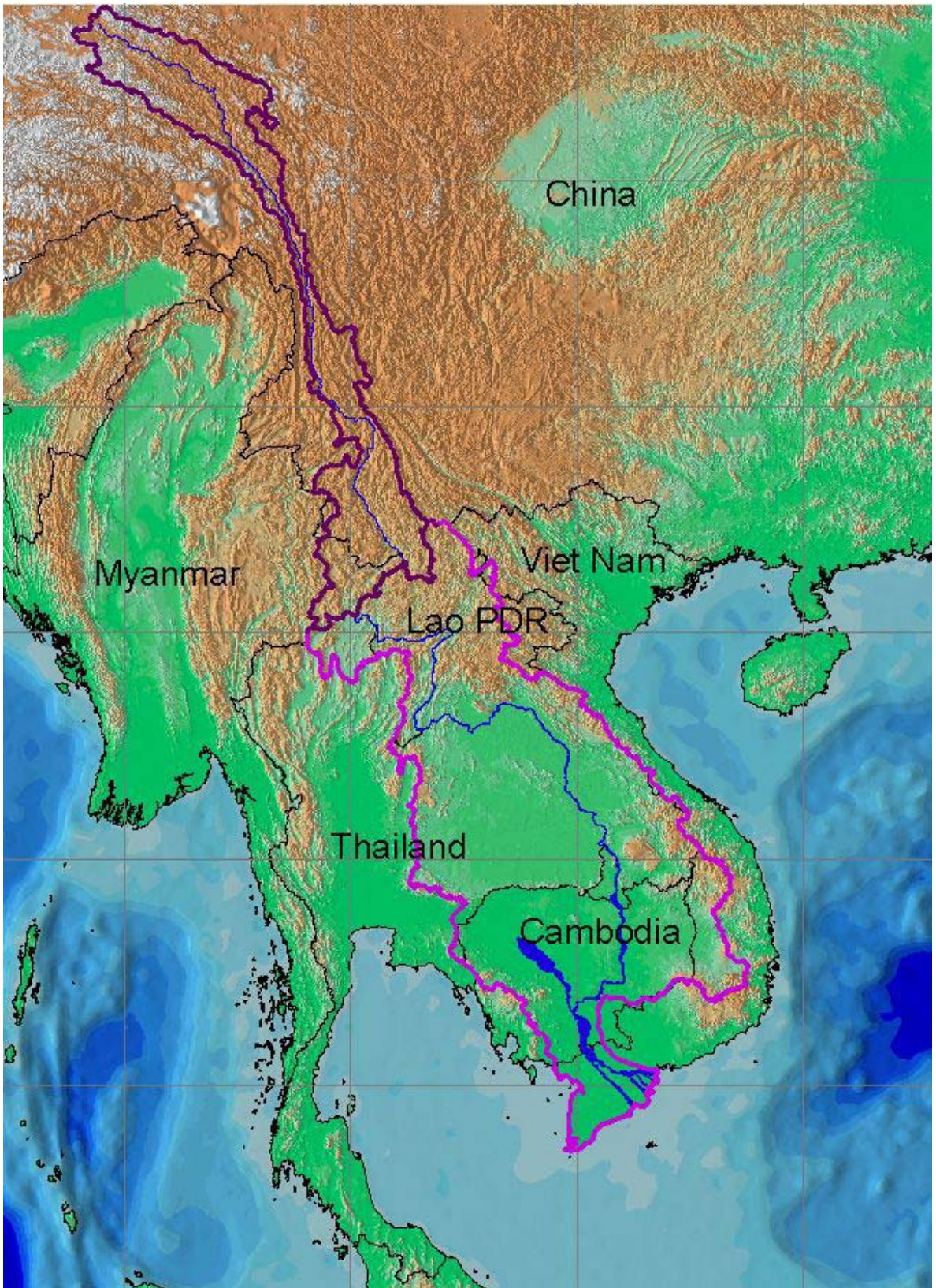
Description	Yunnan	Mya	Lao	Tha	Cam	V/N	Total
Catchment (Km²)	165,000	24,000	202,000	184,000	155,000	65,000	795,000

% of Basin	22%	3%	25%	23%	19%	8%	100
% of country	38%	4%	97%	36%	86%	20%	
Average Flow (m3/s)	2,410	300	5,270	2,560	2,860	1,660	15,060
Percentage	16%	2%	35%	17- 18%	18- 19%	11%	100
Population	10 mil	0.5 mil	4.9 mil	24.6 mil	10.8 mil	21 mil	71.8 million



Source: World Bank

Mekong Basin Location Map. 2



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